

CLAIMS

1. Device for measuring the iridocorneal angle, characterized in that it comprises:

5 - a light source (14) adapted to produce differences of contrast in an image,
 - image capture means (10), and
 - image processing means (22) connected to said image capture means (10),

10 said image processing means (22) receiving an image of the eye captured by said image capture means (10) and supplying at its output a value of the iridocorneal angle obtained by analyzing contrast differences in said image.

15 2. Device according to claim 1, characterized in that the light source (14) emits in the visible spectrum.

 3. Device according to claim 1 or claim 2, characterized in that the light source (14) is a light-emitting diode.

20 4. Device according to claim 1, claim 2 or claim 3, characterized in that the image capture means (10) comprise a CCD video camera.

 5. Device according to any preceding claim, characterized in that it further comprises image capture triggering means (20).

25 6. Device according to claim 5, characterized in that said triggering means (20) comprise a trigger on the image capture means (10).

30 7. Device according to claim 5, characterized in that said triggering means (20) comprise a footpedal connected to the image capture means (10).

 8. Device according to any preceding claim, characterized in that the image processing means (22) comprise a data processing system adapted to execute image analysis software (L).

35 9. Device according to claim 8, characterized in that said image processing means (22) comprise storage means (42, 44).

10. Device according to claim 9, characterized in that said storage means are adapted to store a file (f(I,P)) containing said captured image.

5 11. Method of operating a device for measuring the iridocorneal angle according to any preceding claim, characterized in that it comprises the following steps:

10 - the light source (14) is positioned (24) relative to the eye (12) so that the optical axis of the light source (14) forms a predetermined angle of incidence with the main axis of the eye;

- an image of the illuminated eye is captured (26) with the image capture means (10); and

15 - the captured image is processed (30) using contrast differences in the image to determine a value of the iridocorneal angle.

12. Method according to the preceding claim, characterized in that it further comprises a step of storing (28) the captured image.

20 13. Method according to claim 11 or claim 12, characterized in that, during the image processing step (30), the distance between the geometrical center of the eye and the periphery of the trabecular reflection is measured at a plurality of angular positions.

25 14. Method according to claim 11, claim 12 or claim 13, characterized in that the angle of incidence is 18 ± 2 degrees.